

**DATE:** February 11, 2014

**FROM:** John Williams – Fiber Optic Engineer

**Erwin Utilities** 

**TO:** Federal Communications Commission (FCC) Staff

**SUBJECT:** Expression of Interest – Rural Trials

Docket No. 10-90

#### **Background**

Erwin Utilities is a municipal power distributor in Erwin, Tennessee that serves approximately 9,000 electric customers as well as 5,000 water and wastewater customers. Erwin Utilities owns and operates 36 miles of backbone fiber, serving 35 of our remote locations with 1Gbps connections. Erwin Utilities has connected all Unicoi County school buildings on this same fiber backbone with 100Mbps connections.

Erwin Utilities is committed to an all-fiber solution to serve all existing customers. Erwin Utilities' customers have asked for a faster, more reliable connection to the Internet, and Erwin Utilities is ready to provide this service.

At this time, Erwin Utilities does not have an ETC license; however, if funding were provided, Erwin Utilities would meet the requirements set forth by the FCC.

### **Geographic Territory**

Erwin Utilities is proposing to serve all 9,000 electric customers with Fiber-to-the-Home service. Erwin Utilities covers most of Unicoi County and a small portion of Washington County. The service area includes all of census tracts 47171080200, 47171080300, 47171080400 and portions of 47171080100 and 47179061800. Unicoi County is 186-square-miles with a population density of 98 residents per square-mile.

A map showing the portions of Unicoi County that Erwin Utilities currently serves is attached.

### **List of Anchor Institutions**

- Schools: (All Currently Served with 100Mbps by Erwin Utilities)
  - Love Chapel Elementary
  - Rock Creek Elementary
  - Temple Hill Elementary
  - Unicoi Elementary
  - Unicoi County Intermediate School
  - Unicoi County Middle School
  - Unicoi County High School
  - Unicoi County Board of Education
- Libraries:
  - o Col. J.F. Toney Memorial Library
- Health Care Centers:
  - Unicoi County Memorial Hospital and Long Term Care
  - Governors Bend Assisted Living and Retirement Center
  - Erwin Health Care
  - Unicoi County Health Department
  - Urgent Care of Erwin
  - Center for Aging and Health
- Government:
  - Town of Erwin City Hall
  - o Town of Unicoi Town Hall
  - Unicoi County Courthouse
  - Watauga Ranger District
  - o Town of Unicoi Welcome Center

### **Proposed Technology**

Erwin Utilities plans to offer Fiber-to-the-Home services. Erwin Utilities will be offering broadband services at an initial rate of 100Mbps for \$50 per month to residential customers. Within 3 years, Erwin Utilities plans to offer 1Gbps service to residential customers for \$100 per month. Anchor institutions and businesses will have the option of Internet service (100Mbps for \$100 per month) and or point-to-point services up to 1Gbps.

### State and/or Local Government Participation and/or Support for Project

Erwin Utilities does not receive any funding for current telecommunications services. The proposed project will take advantage of Erwin Utilities' right-of-way infrastructure, which reduces the cost and time to complete the project.

## **Existing Providers**

There are currently two broadband providers in Unicoi County. CenturyLink has service up to 10Mbps via DSL to most customers in the county. Comcast has service of up to 100Mbps for portions of the county.

## **Project Timeline**

Erwin Utilities is currently in the process of completing a business plan and will be "shovel-ready" during the second half of 2014.

# **Scalability**

Erwin Utilities has mapped out thirteen 700-customer areas to provide Fiber-to-the-Home services all 9,000 electric customers. These areas could be built one at a time or all at once.

## **Total Utility Investment**

\$6.2 million

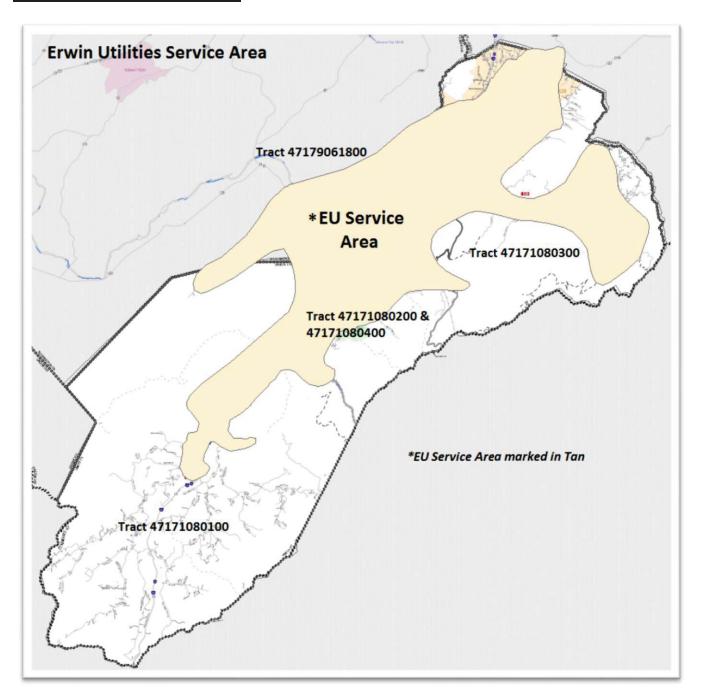
## One-Time Capital Infrastructure Investment Needed

\$1.8 million

# **Total Project Cost**

\$8 million

# **Erwin Utilities' Service Area Map**



Note that Erwin Utilities map shows some portions of the tracts 47171080200, 47171080300, 47171080400 not being covered. These areas are mountains and no power or homes are located in these areas.